Remarks / Arguments

As a result of this amendment, claims 1-3 and 7-9 are pending in the application. No new matter has been added.

General comments:

In claims 1, 2, 3, and 8, the definition of the subscript "y" has been re-introduced. It was mistakenly deleted from the claims in the preliminary amendment, and is needed in the definition of the group S(O)_vR⁸.

In claims 1, 2, 3, and 8, the last line has been amended to recite "or a pharmaceutically acceptable salt thereof", for better precision of language.

The word "when" has been deleted from proviso "f" of claims 1 and 2. It should have been deleted in the preliminary amendment.

Items 2, 3, and 4

The priority, title, and abstract have been corrected as required by the examiner.

Claim Rejections - 35 USC § 112

Item 5:

Claims 1 and 7-9 were rejected under 35 USC §112, second paragraph as being indefinite on the ground that "heteroaryl" is not clearly recited as substituted.

The group "T" is defined in the claims as a substituent, the number "t" of substituents "T" is defined as 1-5, and the structural formula clearly shows that "T" is attached to "R". Therefore, "R" must be substituted. The examiner's statement that "aryl" and "heteroaryl" cannot be substituted is deemed to be incorrect; the quotation from Streitwieser does not confirm the examiner's position. Nevertheless, claims 1 and 8 have now been amended to recite "substituted" heteroaryl in the definition of "R" to provide a reinforcing statement that the heteroaryl group is substituted. It is unnecessary to recite what the substituents are immediately

after the recitation of "substituted heteroaryl" as suggested by the examiner because the T substituents are separately listed later in the claim.

Regarding claim 7, this is an independent claim reciting a pharmaceutical composition comprising a compound of claim 1, 2, 3, or 6 plus an acceptable carrier. There is nothing indefinite about this claim language. If there is indefiniteness in the language of claims 1, 2, 3, or 6, it should be dealt with in those claims.

Regarding claim 9, this is a dependent claim referring to independent claim 8, and there is nothing indefinite about the language used. If there is indefiniteness with respect to the language of claim 8, it should be dealt with therein.

Item 6:

Claims 2 and 3 were rejected under 35 USC §112, second paragraph as being indefinite on grounds that the language "substituted pyridyl" in line 6 has no antecedent basis in the parent claim, which claims "heteroaryl". Applicants respond that claims 2 and 3 are independent claims, not dependent claims, and therefore, antecedent basis in claim 1 is not required.

Item 7:

Claims 1-3 and 7-9 have been rejected under 35 USC §112, second paragraph as being indefinite by reciting " $(Q)_qR^1$ " in proviso "a" without antecedent basis. Applicants submit that "Q" and "q" are obvious clerical errors and should read "G" and "g", respectively, rendering the substituent " $(G)_gR^1$ ". This is supported by the fact that " R^1 " in formula

$$(T)_{t}R$$
 N
 $R^{1}(G)_{g}$
 $(Q)_{q}R^{2}$
 $(Q)_{q}R^{3}$
 $(Q)_{q}R^{4}$
 $(Q)_{q}R^{4}$

is substituted with " $(G)_g$ " instead of " $(Q)_q$ ". No " $(Q)_q$ " is recited as attached to " \mathbb{R}^1 ". Furthermore, examples 141, 142, 207-279, 313, and 320-323 in the specification exemplify the true meaning of proviso a):

-- a) two of (Q)_qR¹, (Q)_qR², (Q)_qR³, and (Q)_qR⁴ may be joined, and taken together with the atom(s) to which they are attached, form a spiro or nonspiro nonaromatic ring of 3 - 8 members containing 0 - 2 heteroatoms selected from the group consisting of N, O, and S;--

by disclosing species wherein a ring is formed by joining 2 of the groups R¹, R², R³, and R⁴.

The necessary correction has now been made to the language of the provisos in claims 1, 2, 3, and 8.

Item 8:

Claims 8 and 9 have been rejected under 35 USC §112, first paragraph, on the grounds that the specification does not reasonably provide enablement for the utilities listed under C8), C11), C16), H1) and E1). The utilities listed under C8), C11), C16) and H1) have been cancelled from claim 8. The expression for cancers under E1) in claim 8 has been amended to be directed to only the specifically listed cancers. These revisions addressing the enablement rejection are considered to make claim 8 allowable.

Claim 9 is dependent on claim 8, and should therefore also now be allowable.

Item 9:

Claims 8 and 9 have been rejected under 35 USC §112, first paragraph, for not reasonably providing enablement for the treatment of all cancers generally. The expression for cancers under E1) in claim 8 has been amended to be directed to only the specifically listed cancers. Claim 9 is dependent on allowable claim 8 and therefore should also be allowable.

Claim Rejections - 35 USC §102

<u>Item 10</u>:

Claims 1 and 2 have been rejected under 35 USC §102(a) as being anticipated by Goff (Tetrahedron Letters). Goff discloses compound 5a. Compound 5a (2-{(2E)-2-[(2,4-

dimethoxyphenyl)imino]-3-methyl-1,3-oxazolidin-5-yl}acetamide) has been disclaimed from claims 1 and 2, overcoming the rejection.

Item 11:

Claims 1-3 have been rejected under 35 USC §102(a) as being anticipated by Larksarp (Journal of Organic Chemistry). Larksarp discloses a number of compounds which are discussed below. Those which are considered to anticipate any of the present claims have been disclaimed in the appropriate claims, overcoming the rejection.

<u>Item 12:</u>

Claims 1-3 have been rejected under 35 USC §102(a) as being anticipated by Tyukhteneva (Khimiya Geterotsiklicheskikh Soedinenii). Tyukhteneva discloses a generic formula which encompasses several compounds. It is not clear from the reference which compounds have been made. As discussed below, all the compounds of the generic formula were reviewed, and those which were considered to anticipate claims were disclaimed, overcoming the rejection.

The Goff, Larksarp, and Tyukhteneva references were reviewed for compounds which appeared to be related to the presently-claimed materials. These are listed by name below with their corresponding structures, for the convenience of the examiner.

Goff- compounds A and B:

A. 2-{2-[(2-ethoxyphenyl)imino]-3-isobutyl-1,3-oxazolidin-5-yl}acetamide

B. 2-{2-[(2,4-dimethoxyphenyl)imino]-3-isobutyl-1,3-oxazolidin-5-yl}acetamide

Larksarp- compounds C - K:

C. N-[3-cyclohexyl-4-vinyl-1,3-oxazolidin-2-ylidene]aniline

D. N-[3-butyl-4-vinyl-1,3-oxazolidin-2-ylidene]aniline

E. N-[3-tert-butyl-4-vinyl-1,3-oxazolidin-2-ylidene]aniline

F. N-[3-cyclohexyl-4-vinyl-1,3-oxazolidin-2-ylidene]-4-methoxyaniline

G. N-[3-butyl-4-vinyl-1,3-oxazolidin-2-ylidene]-4-chloroaniline

H. N-[3-cyclohexyl-4-vinyl-1,3-oxazolidin-2-ylidene]-4-fluoroaniline

I. N-[3-cyclohexyl-4-vinyl-1,3-oxazolidin-2-ylidene]-2,6-dimethylaniline

J. N-[3-ethyl-4-vinyl-1,3-oxazolidin-2-ylidene]-4-methylaniline

K. N-[3-butyl-4-vinyl-1,3-oxazolidin-2-ylidene]-2,6-dimethylaniline

Tyukhteneva- compounds L - S:

L. 2-{(2-[(4-chlorophenyl)imino]-3-ethyl-1,3-oxazolidin-4-yl}-N-ethylacetamide

M. N-ethyl-2-[3-ethyl-2-(phenylimino)-1,3-oxazolidin-4-yl]acetamide

N. N-butyl-2-[3-butyl-2-(phenylimino)-1,3-oxazolidin-4-yl]acetamide

O. N-butyl-2-{3-butyl-2-[(4-chlorophenyl)imino]-1,3-oxazolidin-4-yl}acetamide

P. 2-{2-[(4-chlorophenyl)imino]-3-decyl-1,3-oxazolidin-4-yl}-N-decylacetamide

Q. N-decyl-2-[3-decyl-2-(phenylimino)-1,3-oxazolidin-4-yl]acetamide

R. N-(2-furylmethyl)-2-[3-(2-furylmethyl)-2-(phenylimino)-1,3-oxazolidin-4-yl]acetamide

S. 2-[2-[(4-chlorophenyl)imino]-3-(2-furylmethyl)-1,3-oxazolidin-4-yl]-N-(2-furylmethyl)acetamide

Each of the above compounds was evaluated to determine whether it falls within the language of the present compound claims. Compounds considered to fall within the present claims have been disclaimed in those claims.

Allowable subject matter

<u>Item 13:</u>

Claim 6 has been objected to as being dependent upon a rejected base claim. Claim 1 as amended is deemed to be allowable. Claim 6 is therefore dependent on an allowable base claim and also allowable.

Claim 7 should be allowable once claims 1, 2, 3, and 6 are found to be allowable.

In view of the above amendments and arguments, this application is deemed to be in condition for allowance, and allowance is accordingly requested.

Respectfully submitted,

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